

725 species belonging to 185 genera as compared with 843 species belonging to 96 genera in Vol. VII., and 720 species belonging to 104 genera in Vol. VIII."

This volume commences with a revised table of genera of the subfamily *Acronyctinæ* and a folding diagram of the phylogeny; and pages 496-535 are devoted to additions and corrections to Vols. VII. and VIII., and to a list of undetermined species presumed to belong to the *Acronyctinæ*.

The execution of the letterpress and illustrations is similar to that of previous volumes, and calls for no special comment. A considerable number of species here dealt with belong to well-known European genera, such as *Gortyna*, *Apamea*, *Hydræcia*, *Pyrria*, *Ipimorpha*, *Calymnia*, *Dicycla*, *Arenostola*, *Cænobia*, *Sesamia*, *Calamnia*, *Euterpia*, *Panemeria*, &c., and also several exotic genera, such as *Psychomorpha*, *Oviros*, and *Scudya*, which have generally been (at least provisionally) referred by previous authors to the families Agaristidæ, Lithosiidæ, &c.

## PROCEEDINGS OF LEARNED SOCIETIES.

### GEOLOGICAL SOCIETY.

January 26th, 1910.—Prof. W. J. Sollas, LL.D., Sc.D., F.R.S.,  
President, in the Chair.

The following communications were read:—

1. 'On a Skull of *Megalosaurus* from the Great Oolite of Minchinhampton.' By Arthur Smith Woodward, LL.D., F.R.S., F.L.S., Sec. G.S.

The specimen was discovered and prepared by Mr. F. Lewis Bradley, F.G.S., and shows for the first time the skull of *Megalosaurus*. It agrees closely with the Megalosaurian skulls of other genera already discovered in the Jurassic and Cretaceous of North America, and resembles *Ceratosaurus* in possessing a bony horn-core on the nose. As in the jaws of *Megalosaurus* previously known, the premaxilla of the new specimen bears four teeth; but these teeth are so different from those of the typical *M. bucklandi* of the same horizon, that they prove the Minchinhampton fossil to belong to a distinct species.

2. 'The Vertebrate Fauna found in the Cave-Earth at Dog Holes, Warton Crag (Lancashire).' By John Wilfrid Jackson, F.G.S., Assistant Keeper in the Manchester Museum.

The remains described in this communication were obtained during the systematic investigation by the Author of a cave on Warton Crag (West Lancashire) in 1909.

The cave, known as Dog Holes, is situated on the western side of Warton Crag, and opens on a sloping 'pavement' of limestone. It owes its origin to the erosion of a series of master-joints in the Carboniferous Limestone.

The present entrance to the cave is by a vertical drop from the general level of the 'pavement.' This entrance is undoubtedly of secondary origin, and is due to the falling-in of the weakened roof of one of the passages.

The specimens were derived from the cave-earth below the surface-soil in one of the chambers of the cave. They comprise a large series of small vertebrates, including Rodents, Insectivores, Amphibians, Birds, etc. Among the Rodents are some interesting forms, the chief of which are the Arctic and Norwegian Lemmings, and the Northern Vole.

A large series of non-marine Mollusca was found along with these remains, one species being of particular interest, namely *Pyramidula rulerata*, only known in this country by its fossil remains in Pleistocene deposits.

The Pleistocene age of the remains is fully discussed, as well as their possible mode of origin through a former swallow-hole.

In many respects, the cave and its contents bear a striking resemblance to the famous Ightham Fissures.

March 23rd, 1910.—Prof. W. W. Watts, Sc.D., M.Sc., F.R.S.,  
President, in the Chair.

The following communication was read:—

'On *Palæoxyris* and other Allied Fossils from the Derbyshire and Nottinghamshire Coalfield.' By Lewis Moysey, B.A., M.B., B.C., F.G.S.

After reviewing the bibliography of *Palæoxyris*, the Author records the finding of 22 specimens from Shipley Clay-pit (Derbyshire), and over 130 from Digby Clay-pit (Nottinghamshire), also several isolated examples from other localities in the district.

He describes *Palæoxyris helicteroides* (Morris): noting especially the presence of a 'beak', which had not, hitherto, been adequately described. He then describes *Palæoxyris prendeli* (Lesquereux) from Shipley Clay-pit, again noticing the formation of the 'beak'. The discovery of *Palæoxyris johnsoni* (Kidston) from Digby is noted, and it is proposed that this fossil be removed into the genus *Vetacapsula*.

The Author also describes a specimen of *Vetacapsula cooperi* (Maekie & Crocker) from Newthorpe Clay-pit (Nottinghamshire). He discusses the differences between this and other specimens, and Mackie's type-specimen, but considers it inadvisable to multiply species.

A review of the bibliography of *Fayolia* is followed by the description of a new species from Shipley Clay-pit; also a small compressed example is described as near to *Fayolia dentata* (Renault & Zeiller). The Author then discusses the distribution of these organisms in time, and their possible affinities with the egg-capsules of the Cestracionts and the Chimæroids.